

1. IDENTIFICATION

Trade Name: 4709 Cooling Water Treatment

Chemical Name & Synonyms: Proprietary Cooling Water Treatment Blend

UN/ID No: **UN1760**

2. HAZARDS IDENTIFICATION

Classification: **Corrosive**

Signal Word: **DANGER**

Label Elements:



Health Hazards:

Acute toxicity-Inhalation	Category 1
Acute toxicity - Oral	Category 1
Skin corrosion/irritation	Category 1A
Serious eye damage/eye irritation	Category 1
Specific target organ toxicity (one exposure)	Category 1 Respiratory tract irritation

Physical Hazards:

Corrosive to Metals	Category 1
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Hazard Statements:

H302 Harmful if swallowed.
H313 May be harmful in contact with skin.
H319 Causes serious eye irritation.
H333 May be harmful if inhaled.
H333 May be harmful if inhaled.

Precautionary Statements:

P233 Keep container tightly closed
P234 Keep only in original container
P262 Do not get in eyes or on skin or on clothing
P270 Do not eat or drink or smoke when using this product
P280: Wear protective gloves/protective clothing/eye protection/face protection.

3. COMPOSITION / INFORMATION ON INGREDIENTS

Chemical Name	CAS No	Weight-%
Sulfuric Acid	7664-93-9	25-32%
Phosphoric Acid	7664-38-2	6-10%
Hydroxyethylidene	2809-21-4	1-2%
Benzotriazole (Powder/Granular)	95-14-7	<1%

4. First Aid Measures

General Advice:

P101: If medical advice/attention is needed; have product container this SDS, or label at hand

Eye Contact:

P305/P351/P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do. Continue rinsing.

P337/P313 If eye irritation persists: get medical advice/attention.

Skin Contact:

P303/P361/P353 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower.

P333/P313 If skin irritation or rash occurs: Get medical attention.

P363 Wash contaminated clothing before reuse.

Inhalation:

P340 Remove victim to fresh air and keep at rest in a position comfortable for breathing

P342/P311 If experiencing respiratory symptoms: Call a POISON CENTER/doctor/911

Ingestion:

P310 Immediately call a POISON CENTER/doctor/911

P301/P330/P331 IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.

Note to Physicians: Treat symptomatically.

Self-protection of the First Aider: None specific. General healthcare PPE is appropriate

5. Fire-fighting Measures

Flammable Properties: Non-flammable

Explosive Properties: N/A

Suitable Extinguishing Media: N/A

Unsuitable Extinguishing Media: N/A

Specific Hazards Arising from the Chemical: None known

Protective Equipment and Precautions for Firefighters:

In the event of a fire, wear full protective clothing and MSHA/NIOSH (approved or equivalent) self-contained breathing apparatus with full facepiece operated in the pressure-demand or other positive pressure mode

6. Accidental Release Measures

Personal Precautions: Routine PPE for any spill, no unique requirement.

Environmental Precautions: If not diluted, this product may become a hazardous waste as designated by the EPA under authority of the Resource Conservation and Recovery Act (RCRA)

Methods for Cleaning Up: Product is water soluble and may be diluted and flushed as below described.

Other Information: This product is intended to be used in open recirculating cooling water treatment and discharged to sanitary sewer in its diluted state in tower bleedoff water. Concentrated product may be diluted to a similar working concentration and flushed to sewer or soaked up with absorbent material and landfilled in accordance with local, state, and federal regulations.

7. Handling and Storage

Advice on Safe Handling: Use personal protective equipment as required. Avoid contact with skin, eyes or clothing. Use only with adequate ventilation.

Storage Conditions: Keep container tightly closed in a dry and well-ventilated place. Keep out of the reach of children. Keep containers tightly closed in a dry, cool and well-ventilated place. Keep in properly labeled containers.

Incompatible Materials: See Section 10.

8. Exposure Controls / Personal Protection

Chemical Name	ACGIH TLV	OSHA PEL
Sulfuric Acid	0.2 mg/m ³ TWA	1.0 mg/m ³
Phosphoric Acid	3.0 mg/m ³ TWA	1.0 mg/m ³

Exposure Guidelines N/A

Engineering Controls: Ensure adequate ventilation, especially in confined areas

Personal protective equipment (PPE) Wear suitable industrial protective clothing

Eye/Face Protection: Industrial Safety Glasses and/or face shield

Body Protection: P280 Wear protective gloves/protective clothing.

General Hygiene Considerations: P270 Do not eat or drink or smoke when using this product
P363 Wash contaminated clothing before reuse.

9. Physical and Chemical Properties

9.1. Information on basic physical and chemical properties

Appearance: Clear liquid with slight inorganic odor

pH: 1.0

Specific Gravity: 1.25

Molecular Weight: Mixture

Water Solubility: Completely soluble

Melt/FreezePoint: Not determined

Boiling Point: Not determined

Flammability N/A

Flash Point: N/A

Vapor density: N/A

10. Stability and Reactivity

Stability: Stable under normal conditions of use and storage
Conditions to Avoid: None known
Incompatible Materials: Alkalis, metal alloys, chlorinated hydrocarbons.
Hazardous Decomposition Products: Hydrogen gas, Sulfur Oxides may be released if heated
Possibility of Hazardous Reactions: None known

11. Toxicological Information

Blended product not tested.

Chemical	Oral LD50	Dermal LD50	Inhalation LD50
Sulfuric Acid	Rat 2140 mg/kg	N/A	Rat 372 mg/l, 1 hour estimated
Phosphoric Acid	Rat 1911 mg/kg	Rabbit 3940 mg/kg est	15,773 mg/l, 1 hr estimated
Hydroxyethylidene	Rat >2000 mg/kg	Rabbit >10,000 mg/kg	No Data Available
Benzotriazole (Powder/Granular)	Rat 560 mg/kg	Rat >1g/kg	rat >1.5mg/l 4 hours

Chronic Toxicity: None known
Carcinogenicity: None known
Target Organ Effects: H335 May cause respiratory irritation.

12. Ecological Information

Ecotoxicity: 0% of the mixture consists of ingredient(s) of unknown toxicity.

Chemical Name	Toxicity to algae	Toxicity to fish	Toxicity to daphnia and other aquatic invertebrates
Blended product not tested			
Sulfuric Acid	No Data	45 mg/ml / 96 hrs est.	No data
Phosphoric Acid	No Data	1909 mg/ml / 96 hrs est.	No data
Hydroxyethylidene	EC50/96h/3mg/l	868 mg/ml / 96 hrs est.	EC50/48h/527mg/l
Benzotriazole	EC50/72h/3231mg/l	24.4 mg/ml / 96 hrs est.	EC50/48h/527mg/l
Persistence/Degradability:	No Data		
Bioaccumulation:	No Data		
Mobility:	No Data		

13. Disposal Considerations

Waste from Residues/Unused Products:

This product is intended to be used in open recirculating cooling water treatment and discharged to sanitary sewer in its diluted state in tower bleedoff water. Concentrated product may be diluted to a similar working concentration and flushed to sewer or soaked up with absorbent material and landfilled in accordance with local, state, and federal regulations.

P501 Dispose of contents/container in accordance with local/state/federal regulations

Contaminated Packaging: Do not reuse container for potable / food contact. Wash and rinse thoroughly before reuse / recycling

14. Transport information (USDOT):

Proper shipping Name: Corrosive Liquid, N.O.S (contains Sulfuric Acid)
Hazard Class: Corrosive
UN/ID No UN1760
Packing Group II
Reportable Quantity (RQ) 6,666 lbs (calculated)
Description: N/A



15. Regulatory Information

This product is a "Hazardous Chemical" as defined by the OSHA Hazard Communication Standard, 29 CFR 1910.1200.

All components are on the U.S. EPA TSCA Inventory List.

National Fire Protection Association (NFPA) Ratings:

NSF Certification: N/A



16. Other Information

This Safety Data Sheet compiled from information provided by the raw chemical product manufacturers.